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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/612,350	07/06/2000	Ronald O'Neal Edmark	AUS00057US1	7192

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EXAMINER .

KENDALL, CHUCK O

ART UNIT	PAPER NUMBER
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2192

DATE MAILED: 10/20/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

# Office Action Summary

Application No.

09/612,350

Applicant(s)

EDMARK ET AL.

Examiner

Chuck O. Kendall

Art Unit

2192

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 21 July 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-34 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 1-34 is/are allowed.
- 6) ☐ Claim(s) \_\_\_\_\_ is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

***Detailed Action***

1. Applicant's arguments, see Appeal brief, filed 07/21/06, with respect to claims 1 – 34 have been fully considered and are persuasive.
2. Claims 1 – 34 are still pending in this Application.

***Claim Rejections - 35 USC § 101***

3. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

4. Claims 28, 33 and 34 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter. Claims 28,33 and 34 draw limitations to a computer program product. A computer program product per se is no more than a computer program and hence would be software per se. Based on the Interim Guidelines for Examination of Patent Application for Patent Subject Matter Eligibility

“ Data structures not claimed as embodied in computer-readable media are descriptive material per se and are not statutory

because they are not capable of causing functional change in the computer. See, e.g., Warmerdam, 33 F.3d at 1361, 31 USPQ2d

at 1760 (claim to a data structure per se held nonstatutory). Such claimed data structures do not define any structural and functional

interrelationships between the data structure and other claimed aspects of the invention which permit the data structure's functionality

to be realized .”

***Claim Rejections - 35 USC § 102***

5. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

6. Claims 1 -10 are rejected under 35 U.S.C. 102(e) as being anticipated by Guinther et al. (USPN 6,016,466, hereafter referred to as Guinther).

As per claim 1, Guinther disclose the "receiving an event indication" (Guinther, col. 21:24 -26);

Guinther also teaches "ascertaining kernel thread level profile information" (Guinther, col. 21: 29 - 33);

Guinther also discloses "calculating" thread level profile information (Guinther, col. 21:1 - 3);

Guinther also teaches "identifying a kernel thread" (Guinther, col. 20: 43 - 48);

Guinther also discloses "determining whether the identified kernel thread has been reused" (Guinther, col. 21:13 -14);

Guinther also teaches "updating" profile information (Guinther, col. 2:1-3).

As per claim 2, as applied to claim 1 above, Guinther discloses "checking a hash table for . . . [a] thread" (Guinther, col. 20, line 64, to col. 21, line 2).

As per claim 3, as applied to claim 1 above, Guinther teaches "applying the difference kernel thread level profile information . . . to one of a . . . thread" (Guinther, col. 21, line 64, to col. 22, line 11).

As per claim 4, as applied to claim 2 above, Guinther discloses "applying the difference kernel thread level profile information . . . to one of a . . . thread" (Guinther, col. 22,1 - 8);

Guinther also teaches "marking the previous Java thread being terminated" (Guinther, col. 22: 9 - 11);

Guinther also discloses "associating the reused identified kernel thread with the new Java thread in the hash table" (Guinther, col. 21:15 -18).

As per claim 5, as applied to claim 1 above, Guinther teaches "the profile information is stored in a node" (Guinther, col. 21:13-14).

As per claim 6, as applied to claim 1 above, Guinther discloses "sending a request for kernel thread level profile" and "receiving the request for kernel thread level profile information" (Guinther, col. 21:29 - 31);

Guinther also teaches "accessing a processor data are containing processor level accumulated profile information" (Guinther, col. 21: 36 - 41);

Guinther also discloses "calculating a change in processor level accumulated profile information" (Guinther, col. 21: 49 - 55);

Guinther also teaches "accessing kernel thread level profile information held" (Guinther, col. 22:1 - 3);

Guinther also discloses "updating kernel thread level profile information . . . with the change in processor level accumulated profile information" (Guinther, col. 22:6 - 11);

Guinther also teaches "sending the kernel thread level profile information . . . to the requestor" (Guinther, col.9:18-21).

As per claim 7, as applied to claim 5 above, Guinther discloses "the kernel thread level profile information relates to the accumulated amount of resources consumed in processing a specific kernel thread" (Guinther, col. 20:37- 57).

As per claims 8 and 9, as applied to claim 1 above, Guinther teaches "updating an information area for a current for a Java thread based on the identified kernel thread having not been reused" and "the identified kernel thread having been reused" (Guinther, col. 2:13-14).

As per claim 10, as applied to claim 1 above, Guinther discloses "accessing an information for a Java thread based on the identified kernel thread" (Guinther, col. 21:29 - 36).

As per claim 11, the method of claim3 wherein the application is a java application (18:10 – 15, discloses intermediate byte code instructions, interpreter and virtual machines which Examiner interprets to be inherent in a Java application).

7. Claims 12 - 32 are rejected under 35 U.S.C. 103(a) as being unpatentable over Guinther and the Java Virtual Machine Profiler Interface (JVMPi) (<http://java.sun.com/products/jdk/1.2/docs/guide/jvmpi/jvmpi.html>; hereafter referred to as JVMPi).

As per claim 12, 18, 19, and 26, Guinther teaches, by implication, the "receiving a value of a metric variable for a kernel thread" and the "calculating a difference value for the metric variable" (Guinther, col. 22:1- 8);

Guinther also discloses "determining if the kernel thread has been used" (Guinther, col. 21:59- 61);

Guinther does not expressly disclose "applying the difference value of the metric variable to a Java thread."

However, the JVMPI does disclose the application of a metric variable difference to a Java thread record (JVMPI, pg. 35). Thus, at the time the invention was made, it would have been obvious to a person of ordinary skill in the art that the profiling of Guinther could be combined with the Java thread profiling of JVMPI. One of ordinary skill in the art would have been motivated to do this in order to obtain run time information for a Java program.

As per claims 14, 20, 22, 27, and 29, as applied to claims 11, 19, and 26 above, Guinther teaches "identifying the first application thread as being terminated" (Guinther, col. 22: 9 - 11); "updating an information area for a current for a Java thread based on the identified kernel thread having not been reused" and "the identified kernel thread having been reused by the first application thread" (Guinther, col. 21:13-14).

As per claims 15, 23, 30, and 33 as applied to claims 11, 19, and 26 above, Guinther discloses information area for a current for a Java thread based on the identified kernel thread having not been reused, (Guinther, col. 22: 9 - 11)) and for receiving an event indication/occurring (Guinther, col. 21:24 -26);

As per claims 16,17, 24, 25, 31, 32 and 34, as applied to claims 11,19, and 26 above, Guinther teaches,"comparing an identity of the kernel thread to a list of identities of previously used kernel threads" (Guinther, col. 21: 29 -33) and also "the difference value of a metric variable for a kernel thread is a change in value of the metric variable" and "the metric variable relates to one of allocation bytes, allocation objects, time, and live object and live bytes" (Guinther, col. 22:1-11).

### **Correspondence information**

8.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Tuan Dam can be reached on 571-272-3695. The fax phone number for the organization where this application or proceeding is assigned is **571-273-8300**.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Ck.

*Cheryl Kendall* 10/16/06